

DOCUMENT RESUME

ED 065 483

24

SP 005 810

AUTHOR Estes, Kenneth A.
TITLE Competency-Based Education Development Project. Final Report.
SPONS AGENCY National Center for Educational Research and Development (DHEW/OE), Washington, D.C.
BUREAU NO BR-0-8060
PUB DATE Dec 71
GRANT OEG-0-70-4537 (715)
NOTE 23p.

EDRS PRICE MF-\$0.65 HC-\$3.29
DESCRIPTORS Educational Innovation; *Educational Programs; Effective Teaching; *Performance Based Teacher Education; *Performance Criteria; *Performance Specifications; Student Attitudes; Teacher Attitudes; Teacher Education

ABSTRACT

The purposes of the project at Western Kentucky University were a) to serve as a data-collection agency for the National Project, b) to assist the Teacher Corps faculty in developing competency-based instruction, and c) to monitor the effectiveness of the competency-based instruction provided by the teacher education faculty. Three indicators to ascertain the degree of success were employed: a) intern feedback, b) organization of a competency-based curriculum and c) degree of faculty involvement. Measurement instruments included a questionnaire, opinionnaire, and interviews administered to 36 Teacher Corps Interns. Although 11 of the 36 original Teacher Corps Interns terminated their association with the program for various reasons, it is the feeling of the Teacher Corps directors that if the competency-based program had been instituted earlier in the program, it would have met with greater success. Data obtained suggested that the interns developed a positive overall feeling toward competency-based instruction and the program. Intern responses indicated that they "agreed" that competency-based education was superior to traditional education. The project stimulated seven of the teacher education faculty to become involved in competency-based teacher education. Appendixes are included. (Author/MJM)

ED 065483

FILMED FROM BEST AVAILABLE COPY

D-8060

PA 24

NCERD

SP

FINAL REPORT
Project No. 07107
Grant No. OEG-[REDACTED] (715)
D-70-4537

U.S. DEPARTMENT OF HEALTH,
EDUCATION & WELFARE
OFFICE OF EDUCATION
THIS DOCUMENT HAS BEEN REPRO-
DUCED EXACTLY AS RECEIVED FROM
THE PERSON OR ORGANIZATION ORIG-
INATING IT. POINTS OF VIEW OR OPIN-
IONS STATED DO NOT NECESSARILY
REPRESENT OFFICIAL POSITION OR POLICY.

COMPETENCY-BASED EDUCATION DEVELOPMENT PROJECT

Dr. Kenneth A. Estes
Teacher Corps Director
Western Kentucky University
Bowling Green, Kentucky 42101

December, 1971

U.S. DEPARTMENT OF
HEALTH, EDUCATION, AND WELFARE

Office of Education
National Center for Educational Research and Development

SP0055810

TABLE OF CONTENTS

I.	Summary	
II.	Introduction	Page 1
III.	Methods	2
IV.	Findings	
	Objective One	4
	Objective Two	6
	Objective Three	6
	Objective Four	7
	Objective Five	8
V.	Conclusion	9
VI.	Table 1 Western Kentucky University Fifth Cycle Teacher Corps Interns Responses to Selected Instruments	3
VII.	Table 2 Western Kentucky University Fifth Cycle Teacher Corps Interns Responses to Statements Regarding Competency-Based Education Project Success . . .	5
VIII.	Appendix A Teacher Corps Intern Opinionnaire Western Kentucky University	10
IX.	Appendix B Teacher Corps Intern Questionnaire Western Kentucky University	11
X.	Appendix C A Definition of Competency-Based Teacher Education	14
XI.	Appendix D Teacher Corps Guidelines and Competency-Based Teacher Education	18

SUMMARY

Competency-Based Education Development Project

Dr. Kenneth A. Estes
Western Kentucky University

The purposes of the project at Western Kentucky University were: (1) to serve as a data-collection agency for the National project; (2) to assist the Teacher Corps faculty in developing competency-based instruction; and (3) to monitor the effectiveness of the competency-based instruction provided by the teacher education faculty. The degree of attainment of the major objectives which were instituted to meet the above purposes is the subject of this final report of activities conducted at Western Kentucky University.

The methods employed for ascertaining the degree of success with each objective throughout the program consisted of three indicators of success: (1) Intern feedback. (2) Organization of a competency-based curriculum. (3) Degree of faculty involvement.

The data obtained suggested that the Western Kentucky University Teacher Corps Interns developed a positive overall feeling toward competency-based instruction and the program. In fact, intern responses indicated that they "agreed" that competency-based education was superior to traditional education. The project did stimulate some of the teacher education faculty at Western Kentucky University to become involved in competency-based teacher education.

Competency-Based Education Development Project

Dr. Kenneth A. Estes
Western Kentucky University

INTRODUCTION

This project, conducted by Western Kentucky University, was part of a larger National effort, jointly sponsored by the Teacher Corps and the National Center for Educational Research and Development. The major effort was in the area of implementing a competency-based teacher education program based on the ten models for improving teacher education which were developed for the National Center for Educational Research and Development. A definition of competency-based education is provided in Appendix C and a policy statement regarding the project is presented in Appendix D. The project was involved in documenting and evaluating the program and implementation process. The final report for the total project, including the seven participating institutions, was prepared by Dr. Wilford Weber who served as the National Director of the project.

As part of a larger National project, this local effort was concerned primarily with ascertaining the effectiveness of the Teacher Corps program in developing and implementing competency-based teacher education in a teacher training program designed to prepare middle-school teachers. In fulfilling this primary function, five objectives were developed to provide a means for identifying and measuring the success of the project.

The objectives were:

1. To prepare interns to relate successfully to children and parents from low-income areas.
2. To provide each intern with competency in specified basic teaching skills.
3. To provide an opportunity for the University to develop a concentrated workshop approach to the pre-service training of teachers in four basic areas: Introduction to Education, Psychology of How Children Learn and Develop, Teaching of Reading, and the Sociological Concern of Teaching.
4. To provide an opportunity for school and University faculties to cooperate in providing learning experiences for underprivileged children.
5. To provide an opportunity for the school to use interns in making vital contacts with the community in order to improve the social conditions of the youth.

The degree of success in reaching each of these objectives determined, in part, the total success of the Project at Western Kentucky University. This report is designed to provide more detailed information to supplement the consolidated report of activities conducted at Western Kentucky University which are reported in The Competency-Based Teacher Education Development Projects, Project Number 0-0744, Grant Number OEG-0-70-4535, by Dr. Wilford Weber, dated December 1971.

METHODS

The methods employed for ascertaining the degree of success with each objective throughout the program consisted of three indicators of success. The indicators were:

1. The analysis of the interns' attitudes and feelings toward Teacher Corps and competency-based education. This analysis was made using a variety of instruments which are identified in Table 1. In addition an opinionnaire, which was developed by the project staff, was administered to the interns. A copy of the opinionnaire is found in Appendix A. An interview guide was developed and used to evaluate the interns' perceptions of competency-based education at the close of the project. A copy of the interview guide is found in Appendix B.
2. The organization of new courses related to competency-based systems. The project staff considered the development of competency-based courses within the teacher training program to be a positive indication of the influence of the TC-NCERD project.
3. The degree of faculty interest in competency-based teacher education.

The analysis of Intern perception was considered to be the most important and valuable indication of project success because it was the variable upon which the other two depended. The primary mode of measurement was the questionnaire included as Appendix B. In order to obtain a reflection of different interns' opinions, items were included to which interns could respond either positively or negatively. All items allowed for additional comments and were constructed in a manner to prevent leading answers. Interns indicated their name and the school where they taught. The questionnaire was administered both during and towards the end of the project. Analysis consisted of identifying those attitudes and opinions which had changed most radically and those that seemed most important to all respondents.

FINDINGS

The following presents an evaluation of project success by evaluating the success with each objective based on intern feedback.

TABLE 1

Western Kentucky University Fifth Cycle Teacher Corps Interns
Responses to Selected Instruments

Instrument or Test Item	Time	Mean Score Total*	Mean Score 1-2-3**
Cultural Attitude Inventory	1	158.76	160.30
	2	164.14	166.70
	3	167.46	169.43
Perceptions of Traditional Programs	1	3.45	3.33
	2	2.67	2.67
	3	2.43	2.42
Perceptions of Ideal C-B Program	1	7.34	7.42
	2	7.35	7.58
	3	7.96	8.13
Perceptions of C-B Aspects of Program	2	2.68	2.53
	3	5.31	5.05
Perceptions of Total Program	2	4.31	4.33
	3	5.72	5.75
Perceptions of Knowledge About C-B	2	4.50	4.50
	3	5.56	5.63

* Mean score for all interns who responded at that single testing.

** Mean score for all interns who responded to item/instrument each time it was given.

Explanation of Terminology

1. Cultural Attitude Inventory -- The higher the score the more liberal the views toward low-income, minority persons.
2. Perceptions of Traditional Programs -- As with the remainder of the items, on a nine point scale with one being very negative and nine being very positive.
3. Time 1 refers to pre-preservice.
4. Time 2 refers to post-preservice/pre-service.
5. Time 3 refers to post-inservice.

OBJECTIVE ONE: TO PREPARE INTERNS TO RELATE SUCCESSFULLY TO CHILDREN AND PARENTS FROM LOW-INCOME AREAS.

At the beginning of the project, during the pre-preservice period, the interns were administered the Cultural Attitude Inventory (CAI). The CAI scores presented in Table 2 indicate the degree of liberality with which a person views low-income, minority persons. The higher the score the more liberal the attitudes. The mean score total for all interns who responded at that single testing was 158.76. Many of the interns had misconceptions about the socio-economic status of low-income families prior to entering the program and hence were skeptical about teaching children from disadvantaged homes.

The CAI was again administered during the interns' pre-inservice period. The mean score total had risen 5.38 mean score points to a new total mean score of 164.14. Thus, after a short time in the program, the interns had already begun to change their attitudes to a more realistic liberal level of conception.

Finally, the CAI was administered at the post-service period yielding a mean score of 167.46; an increase of 3.32 mean score points. At that time, some of the interns' attitudes and feelings showed almost radical changes from what they had at first felt toward low-income families and their children. That the interns had adopted more liberal attitudes toward these people was evident by the 8.70 increase in mean score points.

The questionnaires and interviews conducted throughout the project also demonstrated the progressively more realistic change in attitudes toward disadvantaged children as shown in Tables 1 and 2. Among the biggest disappointments of the interns was in not being able to reach and help enough of these children. Evidence that the interns had learned to relate to low-income and disadvantaged people was provided by the manner in which their students regarded competency-based teaching methods. When asked how their students responded to them and competency-based innovations, the interns replied: They like it; they perform better; there is a definite change; the ones you think would be least likely to participate try hardest; they are responding better than before; and most important their attitudes have changed!

From the above list of student responses, the results of interview and questionnaire reports shown in Table 2, the CAI scores in Table 1, and the fact that only two of the interns felt they were not accepted by the community, it was obvious that the program was effective in preparing the interns to relate successfully. They were prepared in such a manner that, for the most part, they immediately enjoyed their role as a teacher. This would not have occurred as soon if they had not been adequately prepared.

Western Kentucky Fifth Cycle Teacher Corps Intern Responses To Statements Regarding
Competency-Based Education Project Success

Statement	Responses ¹					\bar{X}
	SD	D	U	A	SA	
1. Competency-based education is better than traditional education.	0	0	6	17	5	3.83
2. CBE places less pressure on me as a student.	0	3	9	13	3	3.57
3. I feel I can achieve more and learn more from CBE.	0	1	8	15	4	3.78
4. I believe I will receive higher grades in CB instruction.	0	0	21	7	0	3.25
5. CBE is realistic.	1	2	5	18	2	3.68
6. Involvement in Teacher Corps will help me to be a better teacher than if I had completed a traditional program.	0	3	4	10	11	4.04
7. My classroom experiences at Western are worthwhile.	0	4	10	4	10	3.71
8. My classroom experiences at the school where I teach are very valuable.	0	0	1	9	18	4.61
9. The Teacher Corps program is in general a "good" program.	1	1	3	18	5	3.84
10. The students are benefitting the most from the present Teacher Corps program.	0	7	6	11	4	3.43

¹ The responses were each given a value: SD=Strongly Disagree, and has a value of 1; D=Disagree 2; U=Undecided 3; A=Agree 4; SA=Strongly Agree 5.

OBJECTIVE TWO: TO PROVIDE EACH INTERN WITH SOME COMPETENCY IN SPECIFIED BASIC TEACHING SKILLS.

In order to ascertain the degree of success with this objective, the interns were asked to reply to questionnaires and opinionnaires, copies of which are Appendices A and B. A summary of their responses at the end of the project follows:

All interns said they were more adequately prepared to enter the teaching profession than the average teacher.

Only one intern said he felt that he could not achieve more and learn more from competency-based education.

Only three interns disagreed that involvement in the Teacher Corps would help them to be a better teacher than if they had completed a traditional program.

Only two disagreed that the Teacher Corps program is a "good" program.

All interns agreed that their courses during the program were better in content and method of teaching than before the competency-based instruction was initiated.

All interns responded that they were using competency-based techniques in teaching, and the majority said their students were benefitting.

All interns said they felt that they were succeeding in the classroom.

From these remarks and the positive attitudes of intern students demonstrated by Table 2, it is apparent that the program succeeded in providing the interns with basic teaching skills.

OBJECTIVE THREE: TO PROVIDE AN OPPORTUNITY FOR THE UNIVERSITY TO DEVELOP A CONCENTRATED WORKSHOP APPROACH TO THE PRE-SERVICE TRAINING OF TEACHERS IN FOUR BASIC AREAS: INTRODUCTION TO EDUCATION, PSYCHOLOGY OF HOW CHILDREN LEARN AND DEVELOP, TEACHING OF READING, AND THE SOCIOLOGICAL CONCERN OF TEACHING.

This objective was accomplished to some degree as shown by the description of one course from the curriculum developed for the Western Kentucky Teacher Corps program. The particular course of concern is described in detail in the total project report by Dr. Wilford Weber, pp. 82-88; thus, only an abstract of the total course function is provided here.

Education 597: Deprivation and Education

The course is a study of the cultural and social forces which deprive students of the experimental tools necessary for successful classroom learning. It offers an investigation of experimental education programs currently operating in impoverished areas.

The four primary areas of concentration are:

1. Understanding the Disadvantaged Child.
2. Understanding the Disadvantaged Child's Home and Community.
3. Teaching the Disadvantaged Child.
4. Programs for Teaching the Disadvantaged Child.

Education 597 was developed and taught as a competency-based course. The content of this course was determined in part by the areas the participating students felt were most important. The instructor felt that this approach provided the maximum amount of relevancy to Teacher Corps Interns. Table 2 shows that the interns tended to agree that their classroom experiences at Western Kentucky University were worthwhile. In addition, this approach satisfied the requirements of the four basic areas of the objective.

OBJECTIVE FOUR: TO PROVIDE AN OPPORTUNITY FOR SCHOOL AND UNIVERSITY FACULTIES TO COOPERATE IN PROVIDING LEARNING EXPERIENCES FOR UNDER-PRIVILEGED CHILDREN.

As statement 10 in Table 2 shows, all underprivileged children concerned were provided with learning experiences. Most interns agreed that the students benefitted from competency-based education. This was accomplished with the cooperation of the faculty, providing competency-based techniques to the interns, and the schools, allowing the interns to practice these techniques. Among the techniques used by the interns to provide learning experiences were:

1. Individualized instruction.
2. Effort grading.
3. Special or group projects.
4. Showing relevancy in education.
5. Describing course expectations.
6. Setting a learning atmosphere of freedom.

7. True reading.
8. Attitude change.
9. True choice of study-learning topics.
10. Class discussion on current events.

Both school and university faculty gave their approval to competency-based techniques employed by the interns.

OBJECTIVE FIVE: TO PROVIDE AN OPPORTUNITY FOR THE SCHOOL TO USE INTERNS IN MAKING VITAL CONTACTS WITH THE COMMUNITY IN ORDER TO IMPROVE THE SOCIAL CONDITIONS OF THE YOUTH.

In reaching this objective, the interns were offered guidance by the faculty; however, the interns went out into the community on their own initiative. The interns demonstrated their ability to recognize and accept the responsibility for community contact. They realized that they are not only concerned with improving the youth through education but also through improving their social environment. The interns actively engaged in community service activities, providing themselves as models for the children of the area and fulfilling their role as a productive member of society.

Among the community service activities they participated in are:

	<u>Service</u>	<u>Number</u>
General -	1. School Related	14
	2. Religious	3
	3. Day Care	2
	4. Scouts	5
	5. Adult Education	5
	6. Recreation	8
	<u>Service</u>	<u>Number</u>
Type -	1. Newspaper Publications	1
	2. Radio Programs	1
	3. Sewing Center	2
	4. Student Family Meetings	2
	5. Tutoring	3
	6. Managing Youth Centers	2
	7. 4-H Clubs	2
	8. Volunteer Teacher Corps	1
	9. Sports Activities	1
	10. Community Projects	3

Evaluating total project success should be based on faculty involvement and interest in developing new courses and revising existing courses to fit the competency-based model. At the beginning of the project no faculty members were involved specifically in the development or conduct of competency-based teacher education. At the close of the project there were seven members engaged in developing and teaching using the competency-based model. In addition, several faculty meetings were devoted to the interests, exploration and promotion of the concept. At least one professional education course was organized and taught based upon competencies needed, and two other courses are in the process of being reorganized into competency-based systems.

CONCLUSION

It is concluded that competency-based teacher education is an effective means of dealing with teacher education, and that traditional faculty can and will adopt the concept if they are given technical assistance and support. It is further concluded that Teacher Corps interns, as recipients of competency-based teacher education, are responsive to it and are encouraged by this new approach.

Although eleven of the thirty-six original Teacher Corps interns terminated their association with the program for various reasons, it is our feeling that had we instituted competency-based teacher education earlier in the program they could have continued and been successful.

Developmental efforts such as the one reported here and in the National project report are a desirable and effective way of testing new concepts in teacher education. The support that the seven participating institutions provided each other during the conduct of this project and the support by the NCERD and Teacher Corps staff were extremely valuable in instituting the competency-based teacher education model.

The basic method utilized in this study was the personal interview. All interns were interviewed in the schools where they were teaching at least twice. Certainly the interviews themselves influenced attitudes about competency-based teacher education.

A P P E N D I X A

Teacher Corps Intern Opinionnaire

Western Kentucky University

	Strongly Agree	Undecided	Disagree
1. Competency based education is superior to traditional education.			
2. Competency based instruction places less pressure on me as a student.			
3. I feel that I can achieve more and learn more from competency based education.			
4. I believe I will receive higher grades in competency based instruction.			
5. Competency based education is realistic.			
6. Involvement in the Teacher Corps will help me to be a better teacher than if I had completed a traditional program.			
7. My classroom experiences at Western are worthwhile.			
8. The classroom experiences at the school where I teach are very valuable.			
9. The Teacher Corps program in general is a "good" program.			
10. The students are benefitting the most from the present Teacher Corps program.			

A P P E N D I X B

Teacher Corps Intern Questionnaire

Western Kentucky University

The purpose of this second interview is to see if your attitudes have changed since the last interview.

1. What is your greatest reward in being connected with the Teacher Corps?
2. What is your biggest disappointment in the present Teacher Corps Program?
3. Who is benefitting the most from the Teacher Corps Program?
 1. the students
 2. the other teachers
 3. the administration
 4. the teacher corps interns
 5. other _____
4. What are you doing with your students to make their education competency based?
 1. individualized instruction + _____ -
 2. effort grading + _____ -
 3. special or group projects + _____ -
 4. showing relevancy in education + _____ -
 5. describing what is expected + _____ -
 6. other + _____ -

How are your students responding to these competency based innovations?

5. What is being done in your classes at Western that demonstrates competency based education?

1. individual work
2. projects
3. relevancy in education
4. effort grading
5. other _____

6. How would you compare the courses you are now taking with the courses you had in the fall semester as to

1. course content + _____ - _____
2. method of teaching + _____ - _____
3. instructor + _____

7. What barriers to good teaching are you having in the school in which you are teaching?

1. discipline
2. motivation
3. principal or other teachers
4. personal
5. other _____

8. Could you give me examples of community service activities that you participate in.

1. school related
2. religious
3. day care
4. scouts
5. adult education
6. recreation center
7. other _____

9. What is your greatest concern or problem concerning your involvement in the Teacher Corps Program?

10. How well prepared do you think you will be to enter the teaching profession?

sufficiently insufficiently

So you intend to enter teaching as a profession?

Yes _____ Unsure _____ No _____

11. If a friend of yours became interested in the Teacher Corps Program and asked for your advice, what would your response be?

12. Additional Comments:

APPENDIX C

A DEFINITION OF COMPETENCY-BASED TEACHER EDUCATION¹

The following is a definition of competency-based teacher education which has become widely-used. It is taken from a slide-tape presentation, "Competency-Based Teacher Education: An Overview," which was developed for Teacher Corps by Wilford A. Weber of Syracuse University. The definition has been published elsewhere but the slide-tape script was its place of origin. Excerpts from pages 3 through 12 are presented here:

A competency-based teacher education program is a program in which the competencies to be demonstrated by the student and the criteria to be applied in assessing the competencies of the student are made explicit, and the student is held accountable for meeting these criteria. At first glance, this may appear a rather harsh, mechanistic approach to teacher education yet nothing could be further from the truth for the teacher competencies specified by those involved in the program are those particular attitudes, skills, understandings, and behaviors they feel facilitate the intellectual, social, emotional, and physical growth of children.

The criteria used in assessing the competence of the student are three-fold. First are knowledge criteria--used to gauge the student's cognitive understandings. Performance criteria are employed to assess his teaching behaviors. Product criteria are used to assess his teaching effectiveness; the growth of pupils he has taught are the evidence for this assessment.

The use of these criteria is not unique to competency-based programs. But where traditional programs give greatest weight to the teacher's knowledge, today the trend is toward stronger emphasis of performance and product. Clearly a personal storehouse of information doesn't alone make an effective teacher. What is most meaningful is the teacher's ability to facilitate the learning of children.

Traditional programs and competency-based programs differ in many ways. In a traditional program, time is held constant while achievement varies. The emphasis is on the completion of a certain number of courses regardless of whether the student acquires mastery in all areas of study. On the other hand, in a competency-based program, achievement is held constant and time varies. That is, the competencies to be achieved are specified and the student achieves those competencies at his own rate of progress. He moves as quickly as he wishes and is able.

Traditional programs place heavy emphasis on entrance requirements. Competency-based programs put greatest emphasis not on entrance requirements, but on exit requirements. Simple logic suggests that it is much more germane to examine an individual's abilities after completion of a program, rather

than before he has even entered it. Competency-based education assumes the obvious wisdom of this observation. One dividend of the competency-based approach is to open the doors of teacher education to enable individuals who might otherwise have been excluded from equal educational opportunities. Another dividend is to assure mastery of all competencies.

The competencies that the student is expected to acquire are made explicit through the specification of objectives. Two general types of objectives lie at the heart of competency-based education. The first are instructional objectives. Instructional objectives specify skills, knowledge, behaviors and attitudes to be acquired by the student. Three types of criteria are used in determining the student's level of achievement with respect to these objectives. For example, if the objective is for the student to describe the meaning of higher-order questions, knowledge criteria are applied. If the objective is to have the student demonstrate an ability to ask higher-order questions, performance criteria are brought to bear. If the student is to influence the behavior of children by asking higher-order questions, then product criteria are applicable.

The other set of objectives are expressive objectives. Rather than being competencies the student acquires, they are events he experiences. For instance, the student will read a story to a kindergarten child--while holding the child on his lap. Or the student will visit the home of each of his pupils. These are examples of expressive objectives.

The keystone of competency-based teacher education instruction is the instructional module. An instructional module can be thought of as a set of learning activities intended to facilitate the student's achievement of an objective or set of objectives.

The module consists of the following elements: first, the objective is stated clearly and made public thus making explicit the program's expectations of the student. Second, the pre-test, a diagnostic vehicle that determines what, if any, instructional activities he needs to experience. Then, the instructional activities, self-paced learning experiences intended to facilitate the student's achievement of the objective. When the student feels ready, he takes the post-test, designed to measure his level of mastery in relation to his objective.

Thus, the module approach enhances possibilities for self-pacing, independent study, individualization, personalization, and alternative means of instruction.

Some modules are brief--as little as thirty minutes--yet others may require days, weeks or months to complete. Instructional activities are carried on in diverse settings, ranging from discussions in the seminar room to microteaching in a public school classroom; the sensitivity training session in a dormitory lounge, to the tutorial in a church basement. As noted, the module approach makes possible self-pacing and alternate routes of instruction. Thus, the flexibility of the module

approach appears attractive as an alternative to traditional "lock-step" curricula.

Usually traditional programs consist of rigidly separated disciplines. Within each discrete discipline are courses with particular foci. Due to the dearth of inter-disciplinary integration, many disciplines are walled off from all others. Ingrown interests may drift toward irrelevancy with respect to the student's needs in the real world. Furthermore, overlapping, as well as dangerous gaps, appear in the student's learning.

In a competency-based program, however, the interdisciplinary approach is preeminent in the design of the curriculum. Related objectives are grouped in a single module; related modules are then clustered as components and the components may be given discipline-like labels.

As teaching realities shift--in a world of rapid cultural and technological change--modules, more easily than courses, can be deleted, added or modified to keep abreast of reality.

Besides giving the student greater flexibility in pursuing learning activities, the modular approach also affords the virtues of self-pacing and alternate routes of instruction in the program as a whole.

In traditional programs, a student's time is rather rigidly allocated, with the bulk spent in attending classes and doing homework. In a competency-based program, the student is free to plan his schedule of activities around his needs and interests while working toward the achievement of specific competencies.

Money and student time represent important resources in any teacher education program. Generally, traditional programs have given highest priority to financial considerations. While recognizing realistic fiscal parameters, competency-based programs reflect a concern for maximizing the use of student time--the crucial resource never to be squandered.

Traditional programs find the student largely rivetted to the campus. Contact with children is restricted to the short, senior-year student teaching experience, while independent-study opportunities are of a homework-assignment variety. Precisely because they are reality-oriented, competency-based programs require that students spend proportionately more time interacting with children. The public schools provide the best setting for student-child interaction.

A field-centered curriculum calls for a progression of early-awareness experiences, tutoring, micro-teaching, small-group and total-class teaching responsibilities throughout the student's professional education. And post-baccalaureate internships are a part of the growing trend toward field-centered curricula. Increasingly, programs will provide for resident internships beyond the bachelor's degree for purposes of specialization.

In traditional programs, many faculty hours are spent in lecture situation. Consequently, the faculty member often stands remote from the student. In a conscious attempt to overcome this, the modular approach emphasizes small group work, seminars and counseling. These experiences provide far greater opportunities for closer faculty-student relationships. And better faculty-student rapport increases possibilities for personalization of the student's experience.

Furthermore, competency-based teacher education prompts more efficient utilization of staff. Differentiated staffing patterns in higher education allow personnel from a wide range of sources to bring into harmonious balance their various teacher-educator roles and their individual interests and expertise.

The competency-based approach allows faculty members to escape from the mire of grading, attendance keeping, and other numbing clerical routines, freeing them for more creative roles. One example of such roles is found in faculty collaboration with materials production specialists in the design of educational materials utilizing the new technology.

The sharing of program responsibilities represents a growing trend. In the past, the college or university has borne sole responsibility for the teacher's education. It cooperated only in a limited way with the public schools, jealously excluding from the decision-making process other organizations with estimable investments in teacher education and the education of children. From traditional inwardness, today we are moving toward the sharing of decision-making responsibilities by all who are directly or indirectly concerned: the college, the students, the public schools, and the community, educational governmental agencies, state departments of education, philanthropic foundations, the information and educational industries, teachers' associations and other professional groups.

A further way in which teacher education may be kept relevant in a changing society exists in the benefits to be derived from systems-analysis approaches in program design, development, and operations. Formative data provide feedback concerning both student and program progress thus facilitating data-based decision-making regarding the appropriateness of program objectives, the adequacy of instructional activities, and the effectiveness of program graduates. Thus a competency-based teacher education program remains an open system, capable of regeneration in the face of change.

¹Weber, Wilford A., The Competency-Based Teacher Education Development Projects, Final Report, Project Number 0-0744, Syracuse University, 1971.

APPENDIX D

TEACHER CORPS GUIDELINES AND COMPETENCY-BASED TEACHER EDUCATION²

The October 1970 draft of the Teacher Corps Guidelines provides clear evidence of Teacher Corps commitment to the development of competency-based teacher education programs. Excerpts from the two sections of that draft which most directly describe that commitment are presented here. The first is from the section on page 3, Broadening Programs of Teacher Preparation; the second is from page 24, the section on Competency-Based Teacher Education and Certification.

Excerpt from pages 3 and 4. Teacher Corps projects should offer colleges and universities an opportunity to investigate and adopt new approaches in teacher preparation. Colleges and universities must clearly intend to adopt into their regular teacher education programs those elements which prove successful in their Teacher Corps projects. Hence, the proposals must specify the new approaches which will be undertaken in the Teacher Corps project, the timetable for general adoption should these new approaches be favorably evaluated and a clear statement by whom and by what criteria the decision to adopt will be made. Such new approaches should include:

1. Developing teacher education programs which are dependent upon the ability to exhibit desired teacher competencies and developing a system of learning which permits student self-pacing, alternate learning routes and greater student initiative in learning. Such programs should be characterized by:
 - a. Partnership with school districts and communities;
 - b. Specification of desired teacher competencies and reformulation of learning activities to assist students to develop and demonstrate these competencies;
 - c. Use of internship as an extended period of training and service in schools and communities;
 - d. Systematic planning for program development and for program management;
 - e. Development of a series of modules to allow for student self-pacing and more individualization of learning strategies;
 - f. Use of systematic feedback and evaluation techniques to provide continuous program modification; and
 - g. More personalized learning and increased student responsibility for his own learning.

2. Moving toward university-approved programs of teacher certification and pilot programs for States which wish to develop new certification standards. The programs should be moving toward increased use of criteria based upon teacher performance or behavior and the products of teacher behavior; e.g. children's learning.
3. Establishing internships not only as a training period in regular teacher preparation, but also as a period when interns, functioning as members of a school staff, provide service to children.
4. Establishing "portal schools," or comparable teacher education centers based in public schools but cooperatively supported by schools, universities, teacher associations, and other education agencies for the training and retraining of school personnel.
5. Involving other colleges within the university in reshaping teacher preparation along interdisciplinary lines.
6. Developing a system for continuous feedback and program evaluation from Corpsmembers to both school and university staff to ensure that the internship remains a valid and relevant learning experience.
7. Offering university credit to interns and other personnel for their training and work in the school communities.
8. Using university instructors to teach and provide resources and support to Corpsmembers and regular school staff at school and community sites.
9. Using regular school staff and community members as resource persons and adjunct teacher trainers in university instruction.

Excerpts from page 24. Competency-based programs of teacher preparation are being developed by leading institutions of teacher education. Several states have declared their intent to develop new standards of teacher certification based upon performance standards. The U. S. Office of Education has funded ten universities over the past three years to do developmental and feasibility studies of competency-based teacher education. Teacher Corps is committed to the support of local projects which seek to test and adopt the ideas developed in these models or other approaches comparable in scope.

Teacher Corps funding will be provided to those institutions which seek to specify performance competencies as equivalents to the completion of a university-approved program of teacher certification or to institutions which seek to develop programs comparable in scope.

Support will be provided to colleges of education which seek to work in collaboration with public schools, communities, teacher associations, other centers for educational innovation, and colleges of liberal arts and science.

Such programs are designed to assist students to learn at their own pace and participate in selecting the strategies for their learning. Modular units of learning are a feature of these programs.

The goal is to provide more flexible, personalized patterns of teacher preparation through an internship which fosters the maximum personal and professional development of persons who wish to teach.

Interim steps to individualized training will probably be necessary. Several approaches and program designs are possible. After approval of the proposal, Teacher Corps funds may be expended for consultants who can assist in program development.

² Weber, Wilford A., The Competency-Based Teacher Education Development Projects, Final Report, Project Number 0-0744, Syracuse University, 1971.